

Appl. No. 10/621,651

Amtd. Dated 23 February 2005

Reply to Office action of 11 January 2005

AMENDMENT TO THE SPECIFICATION

Please replace the paragraph marked as [0019] with the following amended paragraph:

[0019] In accordance with an exemplary embodiment of the present invention, as representatively illustrated, for example, in Fig. 1, a system designed to mix and dilute a fuel stream for use in a DMFC is disclosed. Such a system may comprise: a pure fuel inlet 110 which delivers substantially pure MeOH into fuel mixing chamber 100 through fuel opening 140; a bubbling line inlet 120 which delivers a gas into fuel mixing chamber 100 through bubbling opening 150; and a diluted fuel outlet 130 which transports dilute aqueous MeOH out of fuel mixing chamber 100 for use by an external fuel cell stack through fuel outlet opening 160. ~~(need to add a returned fuel line here too)~~. In operation, the gaseous and aqueous output from the fuel cell anode and/or cathode is generally introduced into fuel mixing chamber 100 through the bubbling line inlet 120 (~~Can we use a better term to replace bubbling line?~~) in such a fashion that the turbulent bubbling action that results operates to mix and dilute the reservoir fuel contained therein. This mixing method consumes little power and can quickly dilute pure methanol with the returned fuel and fuel in the mixing chamber.